XCode Installation Instructions for macOS

For macOS 10.14.6 and above

November 2021

To be able to do the mini-project, you will need a development environment. This document aims to guide you through the process of installing such an environment. Please carefully follow the instructions below.

1 Installation of XCode (IDE)

- Download Xcode 11.3.1 from this link: https://drive.google.com/drive/folders/1XA2JgK2DX2njo5iarldIXXY-ctqVanB4?usp=sharing

  Note that it will work with macOS Mojave 10.14.6 and later versions.

- Unzip the file by double-clicking it. It may take a few minutes. Once complete you will see the Xcode icon.

- Drag and drop the Xcode icon to your "Applications" folder.

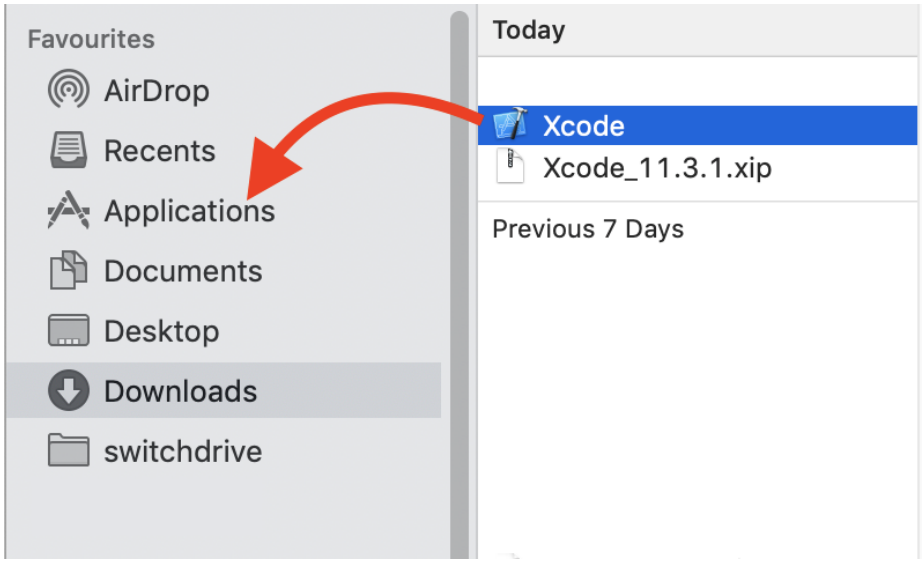

Figure 1

- Open Xcode and "Agree" the user agreement to install. It may take a few minutes.

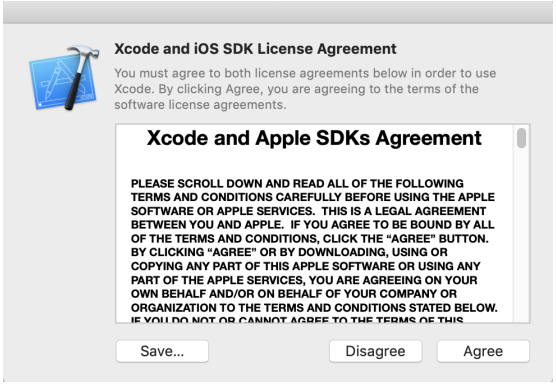

Figure 2

2 Creating a new project

- After the installation, you will see the welcome screen (Fig. 3). Click "Create a new Xcode project".

Figure 3

If you do not see the Welcome screen, choose from the Menu File → New → Project... (see Fig. 4).

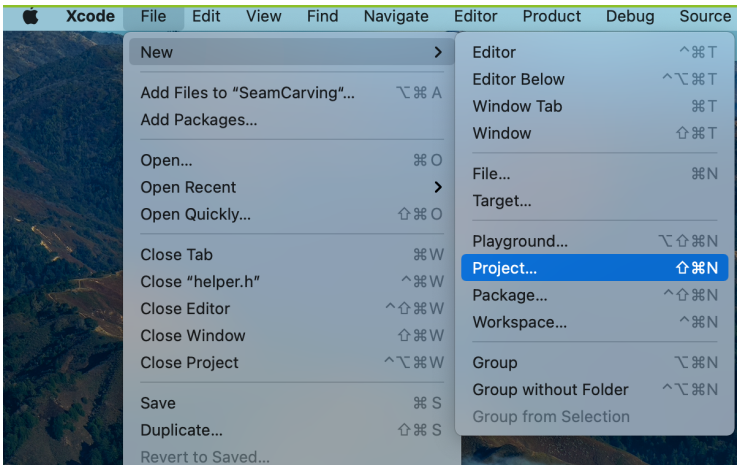

Figure 4

- You will see a selection window with "iOS" tab active. Select "macOS" tab and choose "Command Line Tool" as shown in Fig. 5 and Fig. 6.

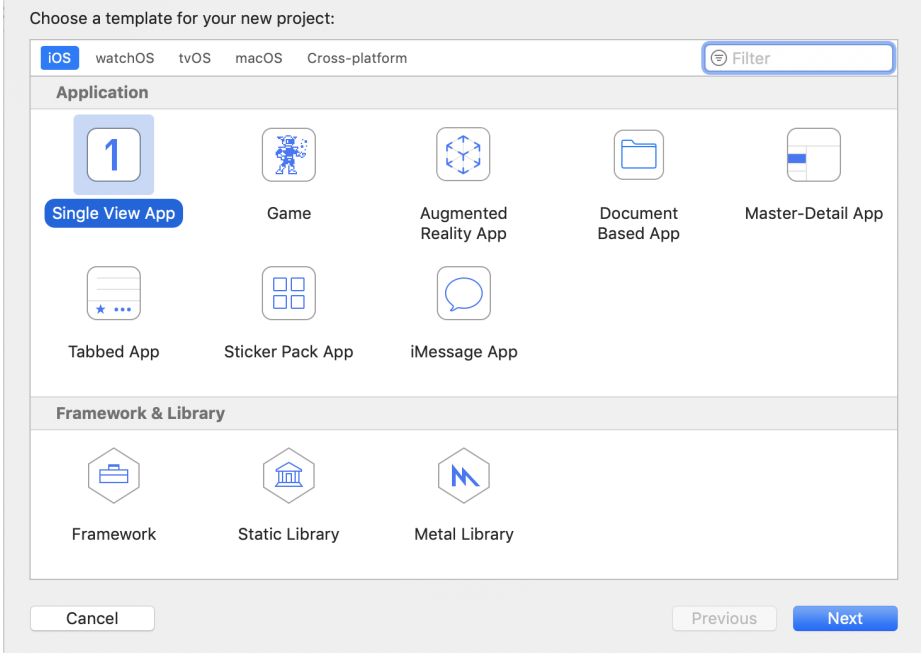

Figure 5

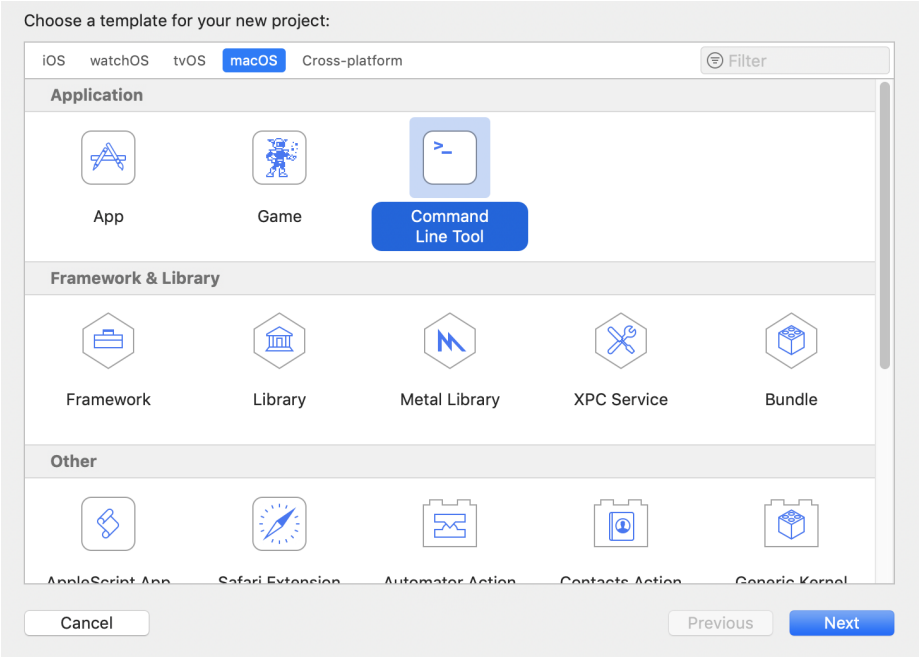

Figure 6

- Type a name for your project, fill in the "Organization name" and "Organization identifier" accordingly. Click "Next" and choose a folder to put your project. We have chosen "Desktop" folder in this tutorial.

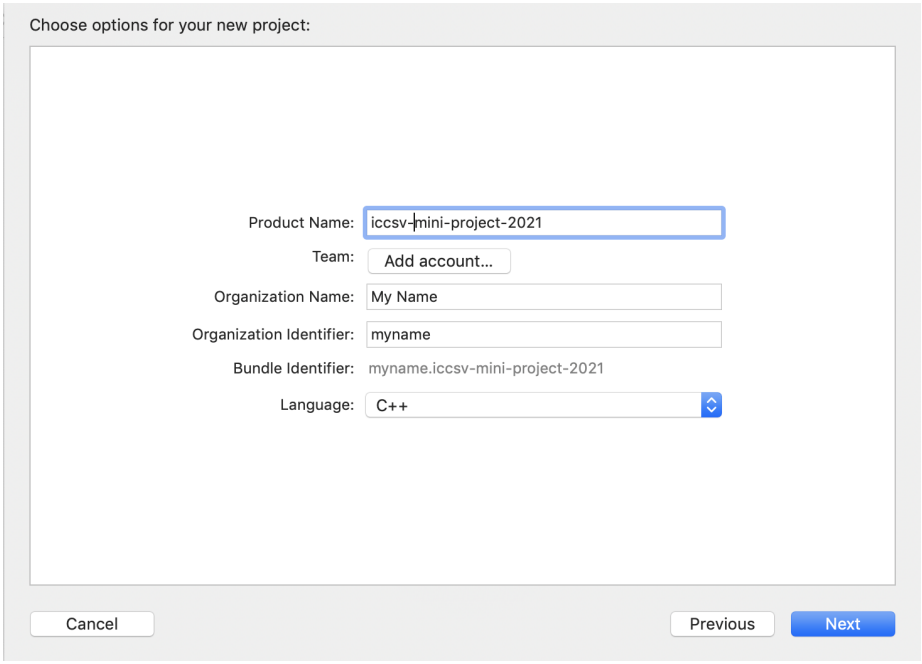

Figure 7

- You should see your project as in the following figure if everything is set up correctly.

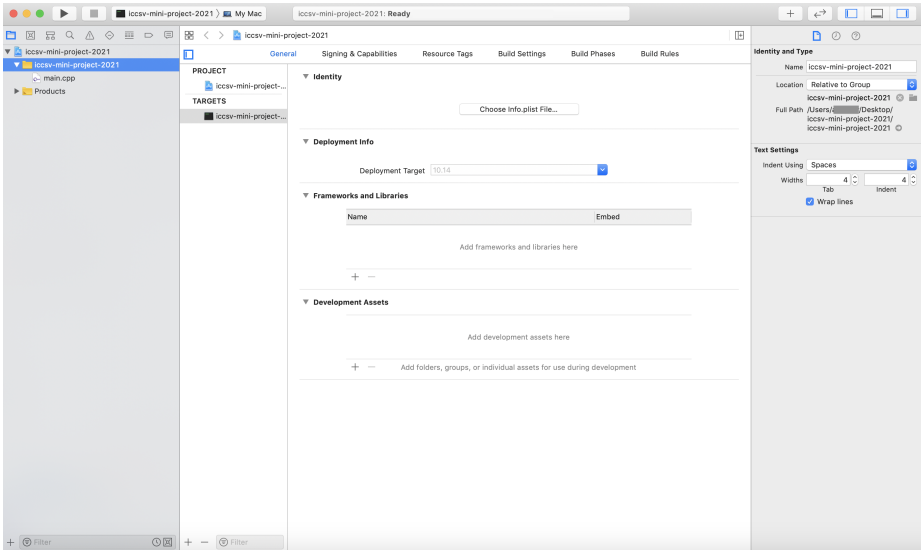

Figure 8

3 Importing the code to your IDE

The following steps presume that you have downloaded a .zip archive containing the material of the project. The archive given as example can be found here (see "archive de test pour l'installation d'un projet").

- Right click on the project name on the left and select "Add files" (see Fig. 9)

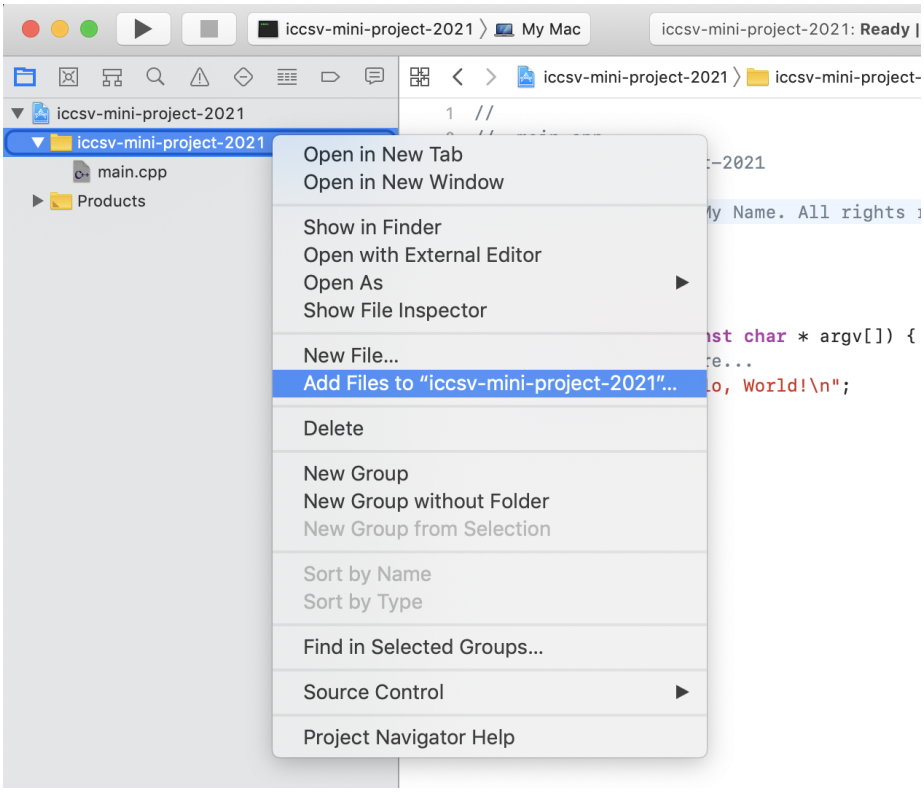

Figure 9

- Select the downloaded files in file dialog window and press "Add" (see Fig. 10).

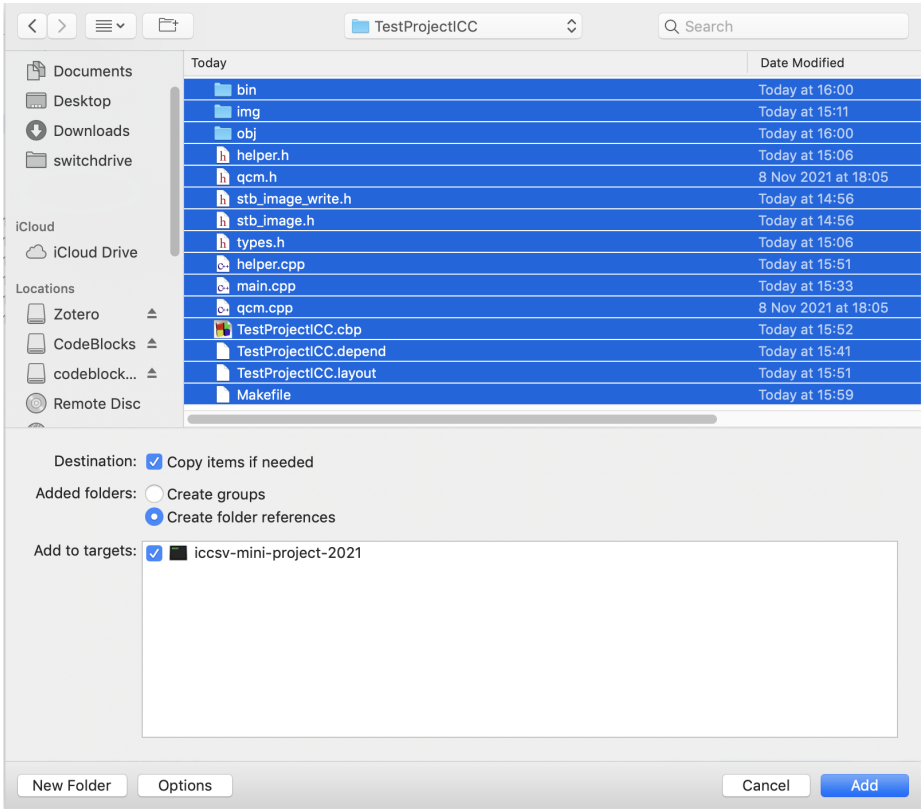

Figure 10

- You should see the following file structure which contains all of the provided files.
- WARNING: If you see two "main.cpp", remove the older one which is created with the project. Otherwise, your code will not compile!

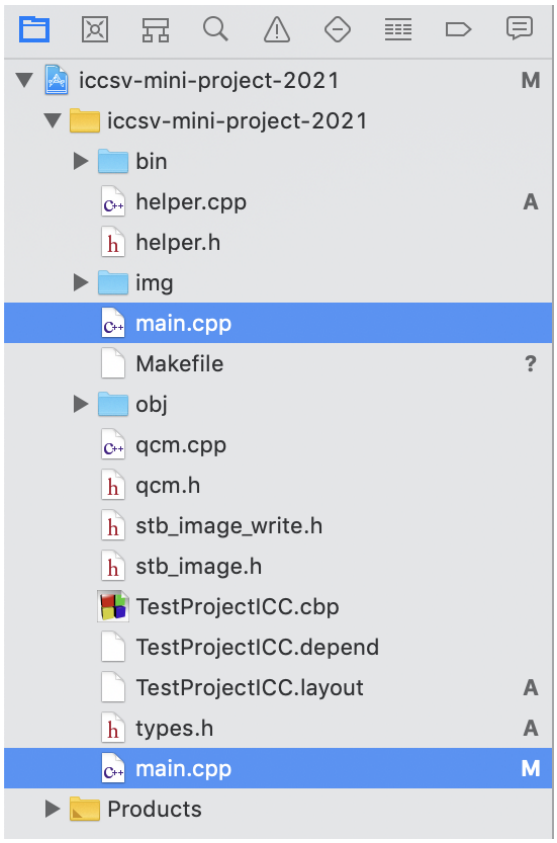

Figure 11

4 Select Run Directory and Run

- Left click on the edit scheme option on the top (see Fig. 12).

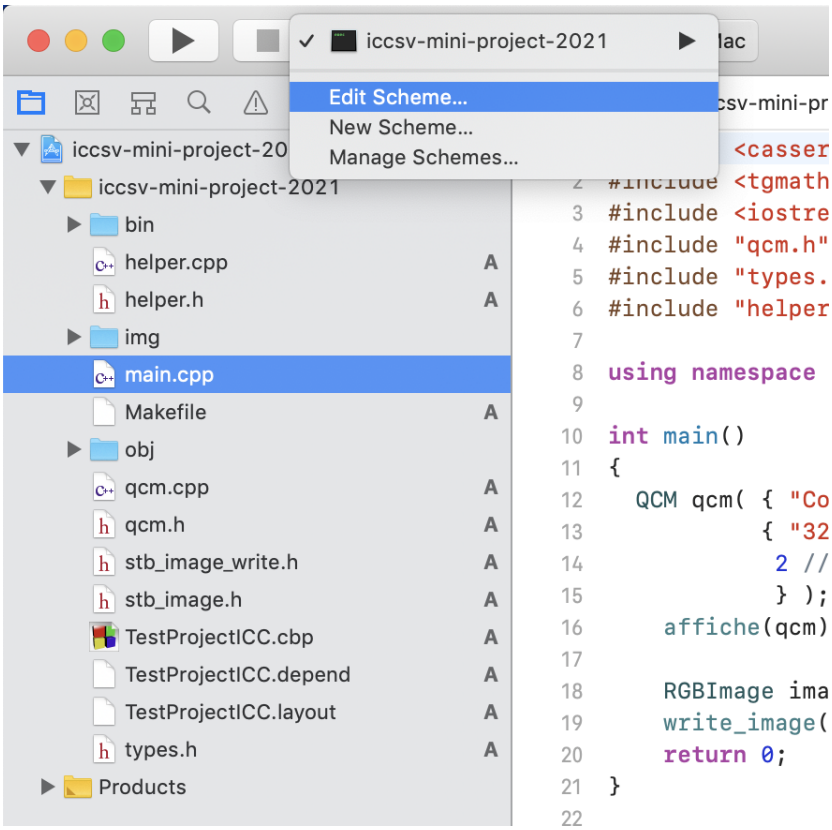

Figure 12

- Select the option tab, select the option "Choose custom working directory", and enter the complete project path as working directory (see Fig. 13).

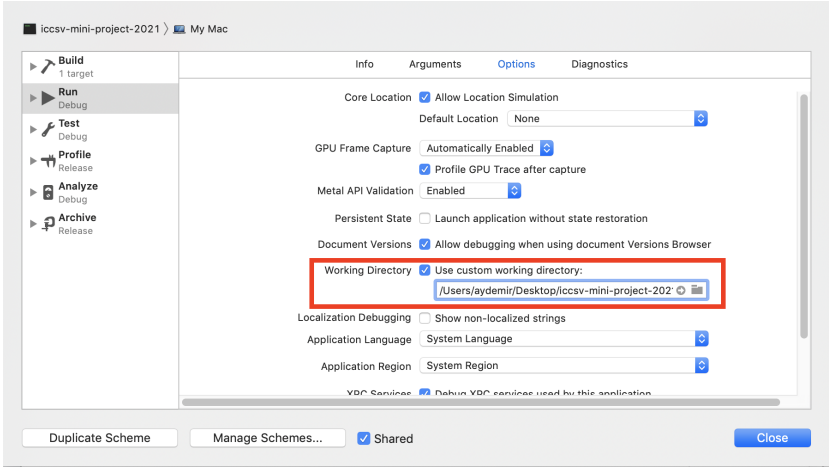

Figure 13

- Click to the triangle at the top left corner to build and run your code. You can see the output of your code at the bottom panel. Given the example of archive provided above, the output should contain the following lines:

```
Combien de dents possede un elephant adulte ?
    1- 32
    2- entre 6 et 10
    3- beaucoup
    4- 24
    5- 2
Info: reading file img/elephant.jpeg
Info: writing file elephant.png
Program ended with exit code: 0
```

  You should also see that a file `elephant.png` is created in the root directory of the project.